

**45554 to 45557—Continued.**

is largely used for stuffing pillows and mattresses and for upholstering, etc., both in the countries where it is grown and in those to which it is exported. The largest supply comes from Java, where the trees are grown as a secondary product. The wood is used to some extent in interior construction, but it is soft, white, and brittle. The tree is readily propagated from seed or cuttings and thrives from sea level up to 2,000 feet. (Adapted from *Macmillan, Handbook of Tropical Gardening and Planting*, p. 518, and *Bailey, Standard Cyclopedia of Horticulture*, vol. 2, p. 700.)

**45558 and 45559.**

From Berkeley, Calif. Seeds presented by Mr. E. B. Babcock, Division of Genetics, Department of Agriculture, University of California. Received November 30, 1917. Quoted notes by Mr. Babcock.

**45558. AQUILEGIA TRACYI × CHRYSANTHA. Ranunculaceæ. Columbine.**

"Unguarded seed from  $F_1$  hybrids between *Aquilegia tracyi* ♀ and *A. chrysantha* ♂. Cross made in 1915. Parents and  $F_1$  plants now in plant-breeding garden of the Division of Genetics, Department of Agriculture, University of California. This seed may produce extremely variable offspring, some of which may be of greater ornamental value than either of the parents."

**45559. DELPHINIUM CARDINALE × (?). Ranunculaceæ. Larkspur.**

"Unguarded seed from an  $F_1$  hybrid between *Delphinium cardinale* [a red-flowered species from southern California] and a garden hybrid with deep-blue flowers. Cross made in 1915.  $F_1$  plants now in plant-breeding garden of Division of Genetics, Department of Agriculture, University of California. This seed may produce extremely variable offspring, some of which may be of greater ornamental value than either of the parents."

**45560 to 45564. PERSEA AMERICANA Mill. Lauraceæ. Avocado.**  
(*P. gratissima* Gaertn. f.)

From Guatemala. Collected by Mr. Wilson Popenoe, Agricultural Explorer for the Department of Agriculture. Received November 24 to December 19, 1917. Quoted notes by Mr. Popenoe.

**45560.** "(No. 212. Avocado No. 26. City of Guatemala. November 13, 1917.) *Manik*. Bud wood of a productive and rather early variety of excellent quality. It is a medium-sized fruit of pleasing form and clear yellow flesh of unusually rich flavor.

"The parent tree is growing in the finca La Polvora, in Antigua. The altitude is about 5,100 feet. While it is growing among coffee bushes and grevilleas, the tree is not crowded and has developed to a large size. It stands about 50 feet high, with a rather slender trunk and a dense crown, the trunk being 2 feet thick at the base and branching about 8 feet from the ground. The age of the tree is probably 30 years or more. It is badly attacked by leaf-gall, but in general has the appearance of a strong, vigorous variety, the branchlets being well formed, long, round, and stout. The bud wood is good, having strongly developed eyes well placed for cutting.

"Antigua does not experience severe frosts; hence, it is impossible to determine in advance of a trial in the United States whether or not the variety is any hardier than the average of the Guatemalan race.